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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/933,633	08/20/2001	Gnanaprakasam Pandian	M-8371 US	6410
33031	7590	03/23/2006	EXAMINER	
CAMPBELL STEPHENSON ASCOLESE, LLP 4807 SPICEWOOD SPRINGS RD. BLDG. 4, SUITE 201 AUSTIN, TX 78759			JUNTIMA, NITTAYA	
			ART UNIT	PAPER NUMBER
			2616	

DATE MAILED: 03/23/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/933,633

Applicant(s)

PANDIAN ET AL.

Examiner

Nittaya Juntima

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 January 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-23 is/are pending in the application.
- 4a) Of the above claim(s) 7, 19 and 20 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1, 3, 5, 6, 8, 14, 15, 21 and 23 is/are rejected.
- 7) ☒ Claim(s) 2, 4, 9-13, 16-18, 22 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 11 July 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date: _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

1. This action is in response to the amendment filed on 1/3/2006.
2. The objection to the claims is withdrawn in view of applicant's amendment.
3. Claims 7, 19, and 20 were cancelled.
4. Claims 1 and 14 stand rejected under 35 U.S.C. 102(b).
5. Claims 3, 5, 6, 8, 15, 21, and 23 are rejected under 35 U.S.C. 103(a).
6. Claims 2, 4, 9, 10, 11, 12, 13, 16, 17, 18, and 22 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claim Rejections - 35 USC § 102

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

8. Claims 1 and 14 are rejected under 35 U.S.C. 102(b) as being anticipated by Liang et al. ("Liang") (USPN 5,781,529).

Regarding claim 1, Liang teaches a method comprising:

a first network switch (a node that receives the CALL SETUP message with Routing DTL information element, col. 7, ll 48-63) receiving a message (a CALL SETUP message, Fig. 3, col. 5, ll 66-col. 6, ll 1) at one (input port) of a plurality of interfaces to the first network switch, wherein the message comprises data (BYTE 0, Fig. 5, which

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includes NODE ID of the current ELEMENT, e.g. ELEMENT #2, of a routing DTL shown in Fig. 4, col. 6, ll 1-16);

the first network switch generating first data (BYTE 0 containing NODE ID of the current ELEMENT, e.g. ELEMENT #2, of the CALL SETUP message and BYTE 1 of the current ELEMENT, e.g. ELEMENT #2, which includes the INPUT SLOT ID of the receiving node) as a function of both the data (BYTE 0 of Element #2) and first interface identifier data (INPUT SLOT ID of the receiving node in the current ELEMENT, e.g. ELEMENT # 2) which corresponds to the one of the plurality of interfaces (col. 7, ll 56-63) and wherein generating the first data comprises concatenating the first interface identifier data with the data (BYTE 0 and BYTE 1 of ELEMENT #2 of the modified CALL SETUP message are concatenated as shown in Figs. 4 and 5, col. 6, ll 2-8 and col. 7, ll 56-63);

the first network switch replacing the data in the message with the first data thereby creating a first modified message (the CALL SETUP message is modified with BYTE 0 of Element #2 and BYTE 1 of ELEMENT #2, col. 7, ll 56-63);

the first network switch outputting (forwards) the first modified message at another of the plurality of interfaces (output port of the received node) (col. 7, ll 63-66).

Claim 14 is a computer readable medium claim corresponds to method claim 1, and therefore is rejected under the same reason set forth in the rejection of claim 1 with an addition of instructions executable by a processor contained in a network switch (operations conducted by processor means at a receiving node, col. 9, ll 25-col. 10, ll 41) implementing the method of claim 1.

Claim Rejections - 35 USC § 103

9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

10. Claims 3, 5, and 15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Liang et al. ("Liang") (USPN 5,781,529).

Regarding claims 3, 5, and 15, Liang teaches the first network switch creating a first SVC/allocating a portion of its data processing resources (VPI/VCI) for processing communication data, wherein the first SVC is created/the portion of its data processing resources is allocated in response to receiving the message (an incoming message, e.g. a SETUP message). See col. 7, ll 56-66, see also col. 2, ll 49-51.

Liang fails to explicitly teach that the first network switch storing data relating to the first SVC/the allocated portion of its data processing resources into a memory location, wherein the memory location corresponds to the first data.

However, an official notice is taken that data relating to the first SVC/ the allocated portion of its data processing resources, e.g. a VPI/VCI value, is usually stored into a memory location of the node in order to keep track of the resource being allocated and the SVC being established.

Therefore, since the first SVC/the allocated portion of the switch's data processing resources, i.e. a VPI/VCI value, is designated by a receiving node and

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corresponds to the corresponding DTL element which includes the NODE ID and input port value of the receiving node (col. 7, ll 56-65), it would have been obvious to one skilled in the art at the time the invention was made to modify the teaching of Liang to include that the first network switch storing data relating to the first SVC// the allocated portion of its data processing resources into a memory location, wherein the memory location corresponds to the first data (i.e. the NODE ID and input port value of the receiving node) in order to keep track of the resource being allocated and the first SVC being established.

11. Claims 6, 8, 21, and 23 are rejected under 35 U.S.C. 103(a) as being unpatentable over Liang et al. ("Liang") (USPN 5,781,529) in view of the admitted prior art (Background of the Invention section of the specification).

Regarding claim 6, Liang teaches that the message (the CALL SETUP message with Routing DTL information element, col. 7, ll 48-63) comprises call reference data (call reference, Fig. 3). However, Liang fails to explicitly teach the first network switch (a receiving node) copying the call reference data into a memory location which corresponds to the first data.

The admitted prior art teaches that each ATM switch (the first network switch) must copy a call reference (the call reference data) into a memory location which corresponds to the switch and SVC or VPI/VCI (specification, page 1, ll 15-page 2, ll 9).

Therefore, since the first data includes NODE ID of the first network switch (see rejection of claim 1), it would have been obvious to one skilled in the art at the time the invention was made to modify the teaching of Liang to include the first network switch

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copying the call reference data into a memory location which corresponds to the first data. The suggestion/motivation to do so would have been to enable the first network switch to identify the corresponding SVC and allocated resource to be released when the call through the switch is to be terminated.

Regarding claim 8, Liang teaches that the first network switch (a node that receives the CALL SETUP message with Routing DTL information element, col. 7, ll 48-63)) must create a first SVC (VPI/VCI, col. 10, ll 42-52 and 56-63) for processing communication data transmitting between at least two end devices (originating and terminating DTEs, col. 4, ll 65-col. 5, ll 3. Liang further teaches call reference data (call reference, Fig. 3).

However, Liang does not teach the first network switch mapping the first SVC to the call reference data.

The admitted prior art teaches that each ATM switch (the first network switch) must map a SVC to a call reference (the call reference data) for SVC release as part of a call termination (specification, page 1, ll 15-page 2, ll 9).

Therefore, it would have been obvious to one skilled in the art at the time the invention was made to modify the teaching of Liang to include the first network switch mapping the first SVC to the call reference data as recited in the claim. The suggestion/motivation to do so would have been to enable the first network switch to identify the corresponding SVC and allocated resource to be released when the call through the switch is to be terminated.

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Regarding claim 21, Liang teaches a method comprising:

a first network switch (a node that receives the CALL SETUP message with Routing DTL information element, col. 7, ll 48-63) receiving a message (a CALL SETUP message, Fig. 3, col. 5, ll 66-col. 6, ll 1) at one (input port) of a plurality of interfaces to the first network switch, wherein the message comprises data (not defined, reads on BYTE 0, Fig. 5, which includes NODE ID of the current ELEMENT, e.g. ELEMENT #2, of a routing DTL shown in Fig. 4, col. 6, ll 1-16);

the first network switch generating first data (BYTE 0 NODE ID of the current ELEMENT, e.g. ELEMENT #2, of the CALL SETUP message and BYTE 1 of the current ELEMENT, e.g. ELEMENT #2, which includes the INPUT SLOT ID of the receiving node) as a function of both the data (BYTE 0 of Element #2) and first interface identifier data (INPUT SLOT ID of the receiving node in the current ELEMENT, e.g. ELEMENT # 2) which corresponds to the one of the plurality of interfaces (col. 7, ll 56-63).

However, Liang fails to explicitly teach the first network switch releasing one switched virtual circuit, SVC, corresponding to the first data.

The admitted prior art teaches that in an ATM network, when a call through a switch is to be terminated, the switch releases its SVC corresponding to the call, and generates a release message instructing the neighboring switches (the first network switch) to release their SVCs (SVCs must also correspond to the respective switch, i.e. NODE ID) corresponding to the call to be terminated. The neighboring switches repeat the process until all SVCs allocated to the terminated call have been released.

Because the first data also includes the NODE ID (col. 7, ll 56-65 and the rejection of claim 1), it would have been obvious to one skilled in the art at the time the invention was made to modify the teaching of Liang to include the first network switch releasing one switched virtual circuit, SVC, corresponding to the first data. The suggestion/motivation to do so would have been to enable a network switch to release a SVC upon receiving a release message.

Claim 23 is a network switch claim corresponds to method claim 22, and therefore is rejected under the same reason set forth in the rejection of claim 22 with an addition of a processor (processor means at a receiving node) and an instruction memory (the processor must include a memory) (col. 9, ll 25-col. 10, ll 41).

Response to Arguments

12. Applicant's arguments, filed 1/3/06, with respect to the rejection(s) of claim(s) 1 and 14 under 35 U.S.C 102(b) have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made in view of different interpretation of the previously applied reference.

The office is now interpreting the "data" as BYTE 0 shown in Fig. 5 which includes NODE ID of the current ELEMENT, e.g. ELEMENT #2, of a routing DTL shown in Fig. 4, col. 6, ll 1-16. Therefore, Liang teaches that the limitation as recited in claims 1 and 14 - the first data comprises concatenating the first interface identifier data with the data (BYTE 0 and BYTE 1 of ELEMENT #2 of the modified CALL SETUP message are concatenated as shown in Figs. 4 and 5, col. 6, ll 2-8 and col. 7, ll 56-63).

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Conclusion

13. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Nittaya Juntima whose telephone number is 571-272-3120. The examiner can normally be reached on Monday through Friday, 8:00 A.M - 5:00 P.M.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ricky Ngo can be reached on 571-272-3139. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Nittaya Juntima
March 8, 2006

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